



STATE OF MARYLAND

DMMH

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Public Health & Emergency Preparedness Bulletin: # 2008:01 **Reporting for the week ending 01/05/08 (MMWR Week #01)**

CURRENT HOMELAND SECURITY THREAT LEVELS

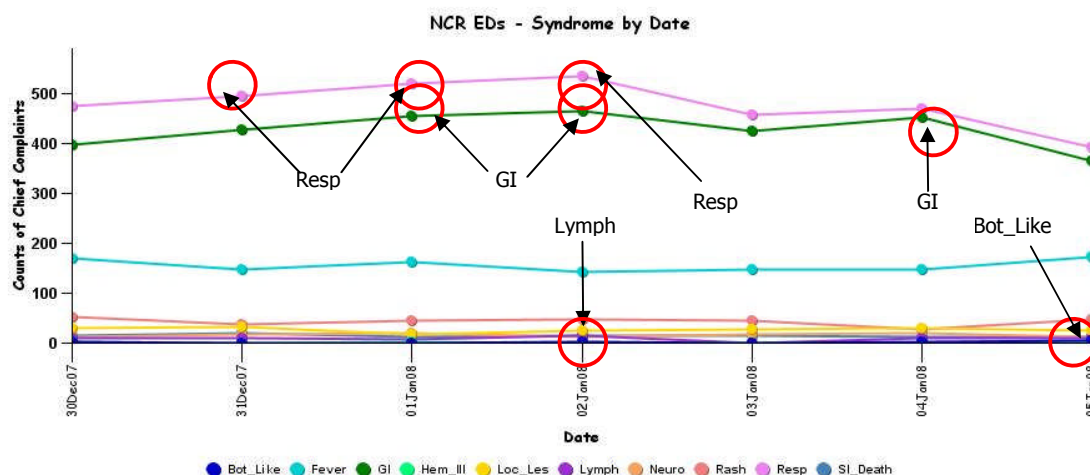
National: Yellow (ELEVATED) *The threat level in the airline sector is Orange (HIGH)
Maryland: Yellow (ELEVATED)

SYNDROMIC SURVEILLANCE REPORTS

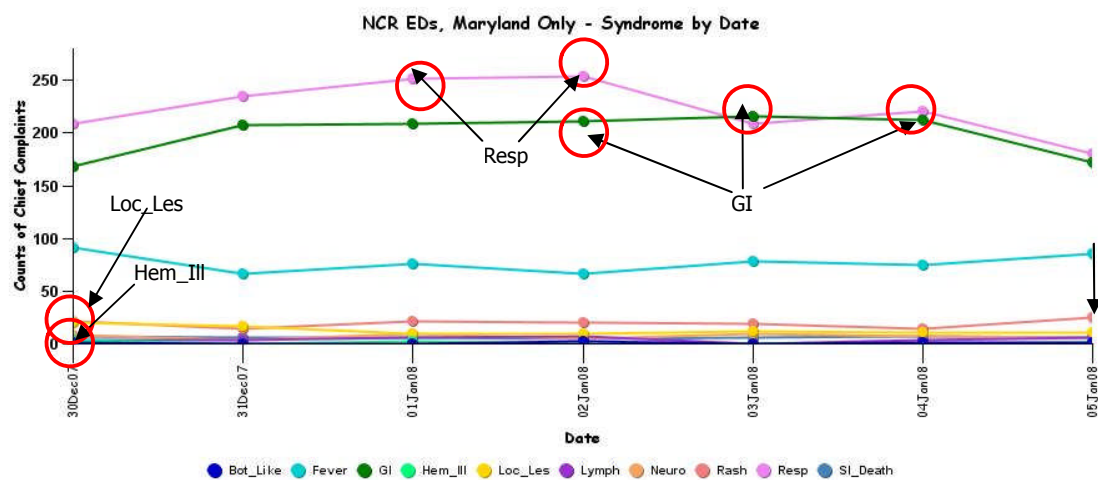
ESSENCE (Electronic Surveillance System for the Early Notification of Community-based Epidemics):

Graphical representation is provided for all syndromes, excluding the "Other" category, all age groups, and red alerts only. Note: ESSENCE – ANCR Spring 2006 (v 1.3) now uses syndrome categories consistent with CDC definitions.

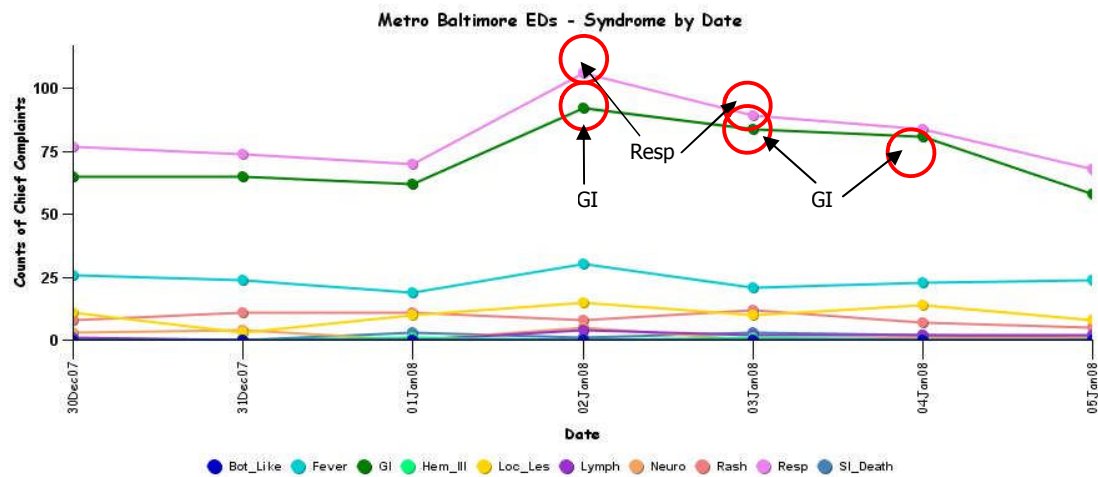
Overall, no suspicious patterns of illness were identified. Track backs to the health care facilities yielded no suspicious patterns of illness.



* Includes EDs in all jurisdictions in the NCR (MD, VA, DC) under surveillance in the ESSENCE system



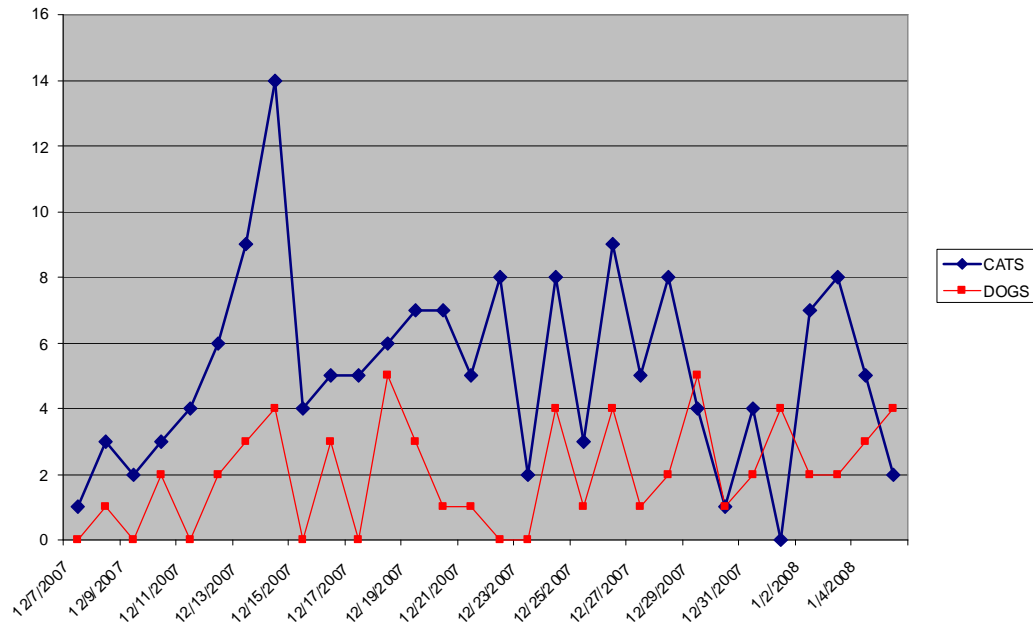
* Includes only Maryland EDs in the NCR (Prince George's and Montgomery Counties) under surveillance in the ESSENCE system



* Includes EDs in the Metro Baltimore region (Baltimore City and Baltimore County) under surveillance in the ESSENCE system.

BALTIMORE CITY SYNDROMIC SURVEILLANCE PROJECT: No suspicious patterns in the medic calls, ED Syndromic Surveillance and the animal carcass surveillance. Graphical representation is provided for animal carcass surveillance 311 data.

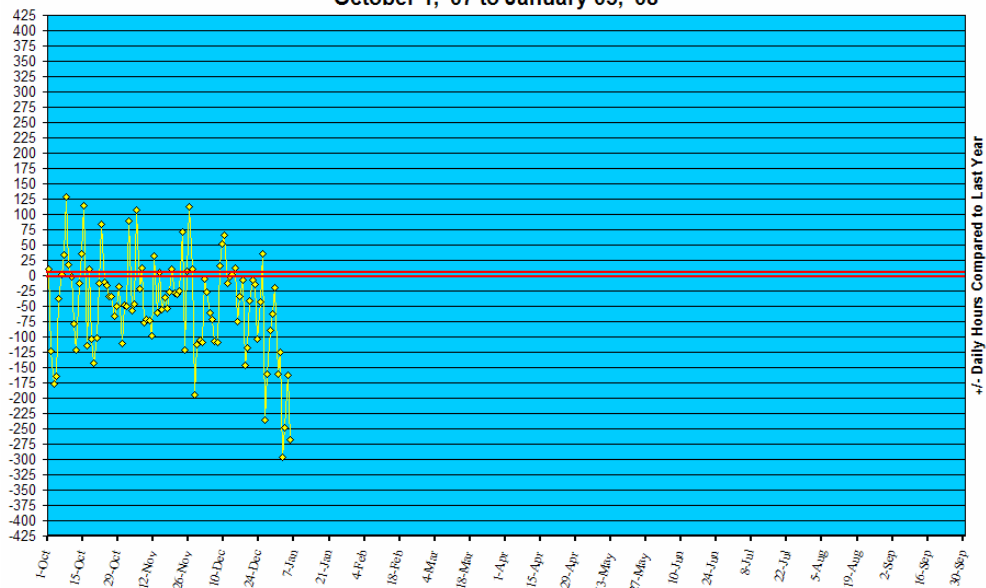
Dead Animal Pick-Up Calls to 311



REVIEW OF EMERGENCY DEPARTMENT UTILIZATION

YELLOW ALERT TIMES (ED DIVERSION): The reporting period begins 10/01/06.

**Statewide Yellow Alert Comparison
Daily Historical Deviations
October 1, '07 to January 05, '08**



REVIEW OF MORTALITY REPORTS

OCME: OCME reports no suspicious deaths related to BT for the week.

MARYLAND TOXIDROMIC SURVEILLANCE

Poison Control Surveillance Monthly Update: Investigations of the outliers and alerts observed by the Maryland Poison Center and National Capital Poison Center in December 2007 did not identify any cases of possible terrorism events.

REVIEW OF MARYLAND DISEASE SURVEILLANCE FINDINGS

COMMUNICABLE DISEASE SURVEILLANCE CASE REPORTS (confirmed, probable and suspect):

Meningitis:	<u>Aseptic</u>	<u>Meningococcal</u>
New cases (Dec 30, 07-Jan 5, 08):	16	0
Prior week (Dec 23-29, 2007):	8	0
Week#01, 2007 (Dec 31, 06-Jan 6, 07):	5	0

OUTBREAKS: 6 outbreaks were reported to DHMH during MMWR Week 1 (Dec. 30, 2007-Jan. 5, 2008):

4 Gastroenteritis outbreaks

2 outbreaks of GASTROENTERITIS associated with Nursing Homes
2 outbreaks of GASTROENTERITIS associated with Assisted Living Facilities

2 Respiratory illness outbreaks

1 outbreak of PNEUMONIA associated with a Nursing Home
1 outbreak of PNEUMONIA associated with an Assisted Living Facility

MARYLAND SEASONAL FLU STATUS:

Seasonal Influenza reporting occurs October through May. Two suspected cases of influenza were reported to DHMH during MMWR Week 01 (December 30, 2007 – January 5, 2008). To date this season, there have been 82 lab confirmed influenza cases in Maryland.

*Please note: Influenza data reported to DHMH through the National Electronic Disease Surveillance System (NEDSS) is provisional and subject to further review.

SYNDROMIC SURVEILLANCE FOR INFLUENZA-LIKE ILLNESS:

Graph shows the percentage of total weekly Emergency Department patient chief complaints that have one or more ICD9 codes representing provider diagnoses of influenza-like illness. This graph does not represent confirmed influenza.



PANDEMIC INFLUENZA UPDATE / AVIAN INFLUENZA-RELATED REPORTS

WHO Pandemic Influenza Phase: Phase 3/4: No or very little human-to-human transmission/Small clusters with limited human-to-human transmission, suggesting that the virus is not well adapted to humans

US Pandemic Influenza Stage: Stage 0/1: New domestic animal outbreak in at-risk country/Suspected human outbreak overseas

*More information regarding WHO Pandemic Influenza Phase and US Pandemic Influenza Stage can be found at: <http://bioterrorism.dhmm.state.md.us/flu.htm>

WHO update: As of January 3, 2008, the WHO-confirmed global total of human cases of H5N1 avian influenza virus infection stands at 348, of which 216 have been fatal. Thus, the case fatality rate for human H5N1 is about 62%.

AVIAN INFLUENZA, HUMAN (Egypt): 31 Dec 2007, On Dec 31, 2 Egyptian women died of bird flu, bringing to 4 the number of fatalities from the virus in the most populous Arab country in less than a week. All 4 deaths involved women and were believed to have resulted from exposure to sick or dead backyard birds. One of the victims, from Menoufia province in the Nile Delta region north of Cairo, was taken to hospital on Dec 29 and died early on Dec 31, Egypt's Health Ministry said in a statement. "She suffered from a high fever and difficulty breathing and had a pulmonary infection after coming into contact with birds suspected of being infected with avian flu". Later, John Jabbour, an Egypt-based World Health Organization official, said that a second woman, from Damietta, also in the Nile Delta, had died of bird flu in northern Egypt. The deaths broke a 5-month pause in human cases in Egypt and brought to 19 the number of Egyptians who have died of the H5N1 bird flu virus since it emerged in Egypt in early 2006. On Dec 30, a 25-year-old Egyptian woman died of bird flu in the Nile Delta city of Mansoura while another woman, died of bird flu on Dec 26 in Beni Suef province south of Cairo, the first case of this winter season. Jabbour said the high fatality rate in the recent cases was likely due to a delay in diagnosis after patients and their family members denied exposure to infected birds. Patients are most likely to survive if they start treatment with Tamiflu early after symptoms occur. Around 5 million households in Egypt depend on poultry as a main source of food and income, and the government has said this makes it unlikely the disease can be eradicated despite a large-scale poultry vaccination program. WHO officials have said the bird flu virus was now considered endemic in Egypt.

AVIAN INFLUENZA, HUMAN (Pakistan): 4 Jan 2008, The World Health Organization (WHO) confirmed on Dec 27 a single case of human-to-human transmission of the H5N1 bird flu virus in a family in Pakistan but said there was no apparent risk of it spreading wider. A statement from the UN agency said tests in its special laboratories in Cairo and London had established the "human infection" through presence of the virus "collected from one case in an affected family." But it said a WHO team invited to Pakistan to look into an outbreak involving up to 9 people, from late October to Dec, had found no evidence of sustained or community human-to-human transmission. No identified close contacts of the people infected, including health workers and other members of the affected family, had shown any symptoms and they had all been removed from medical observation. The outbreak followed a culling of infected chickens in the Peshawar region, in which a veterinary doctor was involved. Subsequently he and 3 of his brothers developed proven or suspected pneumonia. The brothers cared for one another and had close personal contact both at home and in the hospital, a WHO spokesman said. One of them, who was not involved in the culling, died on Nov 23. His was the human-to-human transmission case confirmed by the WHO. The others all recovered. "All the evidence suggests that the outbreak within this family does not pose a broader risk," the WHO spokesman said. "But there is already heightened surveillance and there is a need for ongoing vigilance." It was the first human-to-human case of H5N1 transmission in Pakistan, while others have been confirmed in Indonesia and Thailand in similar circumstances of what the WHO calls close contacts in a very circumscribed area.

AVIAN INFLUENZA (Israel): 4 Jan 2008, Inspectors from the Agriculture Ministry's Veterinary Service began the process of culling some 4000 chickens and turkeys at Moshav Beit Hanania on Jan 4 in an effort to contain the bird flu outbreak detected in a Binyamina kindergarten petting zoo. The process, which is expected to be completed before Shabbat enters sundown, will be carried out at a chicken coop belonging to the Muchersky family, the only one located within a 2-mile radius of the kindergarten. On Jan 3 some 200 chickens were culled in Binyamina. The Agriculture Ministry said lab tests of samples taken from chicken coops in the area were negative, but it will go ahead with the culling as a safety measure against the spreading of the bird flu virus. The chicken coop owners will be compensated, the ministry added. A 4-year-old girl who attended the kindergarten was admitted to the Hillel Jaffe Medical Center in Hadera Jan 3 with flu-like symptoms. Lab results showed that she had not contracted the bird-flu virus but was rather suffering from the Respiratory Syncytial Virus, the most common cause of bronchiolitis and pneumonia among young children.

AVIAN INFLUENZA, LOW PATHOGENICITY H5N2 (Dominican Republic): 5 Jan 2008, Dominican authorities have quarantined and sacrificed a number of birds after detecting a strain of bird flu last month. The World Organization for Animal Health (WOAH) said in a report that 130 birds were slaughtered after authorities discovered a case of the virus near the capital, Santo Domingo, and another some 145 kilometers to the east in the village of Higüey. Officials say the virus is the H5N2 strain, which does not affect humans. Government livestock director Angel Faxas said officials believe the virus reached the Dominican Republic through birds introduced into the country illegally.

AVIAN INFLUENZA, H5 (Portugal): 5 Jan 2008, The culling of more than 16,000 chickens on a farm belonging to the Mafra town council, 40 km from Lisbon, began on Dec 31 after detection of the H5 strain of avian influenza, according to information released by the office of the Portuguese Veterinary Director General (DGV). The official note signaled that the farm is located within the security perimeter established by the DGV after another avian influenza virus strain of H5, not the virulent H5N1 strain, was detected this past Dec 21 in a farm raising partridges. The Portuguese authorities announced that they have established a new security perimeter one km around the new outbreak, among other sanitary measures.

NATIONAL DISEASE REPORTS:

LISTERIOSIS, ALERT (Massachusetts): 30 Dec 2008, The Massachusetts Department of Public Health (DPH) has issued a warning to consumers not to drink any milk products from Whittier Farms in Shrewsbury because of listeria bacteria contamination, which has contributed to the deaths of 2 people. Four cases of listeriosis infection have been identified by DPH, according to a statement released by the state department on Dec 27. The cases occurred in June, October and 2 in November. The 4 cases involved 3 elderly residents and a pregnant woman from Worcester County. Two of the people have died. DNA fingerprinting conducted by the State Laboratory Institute showed that the bacteria causing these infections came from a common source. Samples collected showed product contamination. Listeriosis is a serious foodborne disease that can be life-threatening to certain individuals. "Although evidence suggests that contamination is likely to be at a low level and the risk of infection low, even in those at high risk, it is recommended that consumers do not consume these products and discard any of these products they have," said DPH Director of Communicable Disease Control Dr. Al DeMaria. Symptoms of listeriosis include fever, muscle aches and sometimes gastrointestinal symptoms such as nausea or diarrhea. The illness may be mild, and symptoms are sometimes described as flu-like. (Food Safety Threats are listed in Category B on the CDC list of Critical Biological Agents) *Non-suspect case

PSITTACOSIS (Multi State): 31 Dec 2007, The Georgia Department of Agriculture is quarantining a pet store chain in the state due to psittacosis, a bird disease that can be transferred to humans, Commissioner of Agriculture Tommy Irvin announced on Dec 28. Psittacosis is a bacterial disease that produces flu-like symptoms in humans. "We have had 2 confirmed cases of psittacosis at stores in Hiram and Woodstock. There have also been confirmed cases at the dealer in Florida, that supplied birds to all the stores we are quarantining," said Commissioner Irvin. Also, the Washington State Department of Health issued a warning on Dec 28 that some recently sold cockatiels or other pet birds may carry a disease known as avian chlamydiosis and that exposure to the infected birds may cause a human form of the disease called psittacosis. Some birds shipped by a national distributor tested positive for avian chlamydiosis, and about 20 stores in 11 Washington counties, have received birds from this vendor, according to state health officials. No human cases of psittacosis acquired from the affected pet birds have been reported in the state. The pet store chain has voluntarily removed all birds supplied by the wholesale distributor. Sick and exposed birds are being treated with antibiotics. Store workers have been notified of the risk and instructed in proper cleanup and handling of the birds. Consumers who bought birds from the affected stores will receive letters about avian chlamydiosis and psittacosis. In Connecticut, the State Departments of Agriculture and Public Health also issued a statement on Dec 28 to say the state was notified that cockatiels in several pet stores in the state might have been exposed to avian chlamydiosis. The health officials said no sick birds are known to have been sold and no human cases of psittacosis associated with sick birds have been reported. In Florida, 2 bird samples and 2 samples collected from cages at a bird vendor facility have tested positive for Chlamydia psittaci by PCR. The first positive was collected from a clinically normal bird in a pet store as part of their regular surveillance program. They immediately notified the Florida Department of Health and issued a stop sale on all birds. All birds were isolated and put on antibiotic treatment, and store employees were advised of the symptoms of psittacosis and reminded of store policy regarding personal protective equipment to use when working with birds. All pet stores and public health officials in other states that may have received birds during this time have been alerted and are taking appropriate action. The vendor is currently under voluntary quarantine and is working with their veterinarian, Florida Department of Health, and the Florida Department of Agriculture and Consumer Services to assure that this problem is resolved. (Psittacosis is listed in Category B on the CDC list of Critical Biological Agents) *Non-suspect case

BOTULISM, CANNED SOUP, RECALL (Pennsylvania): 3 Jan 2008, Consumers who purchased or were given "home-canned" soup or other canned products from the Schumacher's Inn in Austin, Potter County, should not open the jars due to the risk of botulism contamination, Health Secretary Dr Calvin B. Johnson said on Jan 3. The state became involved after a 43-year-old Potter County woman, and some of the chicken soup she said she purchased from the restaurant, tested positive for botulism. The Department of Agriculture, which oversees food safety, has quarantined the product and ordered the restaurant not to sell or give away any canned product. Any soup or other products canned by this restaurant should be submitted to the state for testing. (Botulism is listed in Category A on the CDC list of Critical Biological Agents) *Non-suspect case

INTERNATIONAL DISEASE REPORTS:

ANTHRAX, HUMAN, CAMEL, SUSPECTED (Afghanistan): 30 Dec 2007, Eight Afghans who ate an infected camel as part of a religious celebration died of what health experts suspect is a rare case of naturally occurring anthrax, officials

said on Dec 29. The deaths, in the southwestern province of Nimroz, included 2 women and an infant, said Dr. Abdullah Fahim, an adviser to Afghanistan's health minister. Ten others fell sick. Officials cannot say positively that the deaths were anthrax related until laboratory results "expected in the next 2 days" are completed, said Fahim. The outbreak began when 2 men in a remote area of southwest Afghanistan along the border with Iran tried to sell a sick camel, said Ghulam Dastagir Azad, the governor of Nimroz province. Nobody bought the camel, and the men instead killed it and distributed the meat to needy families, as is the custom during the Muslim holiday of Eid al-Adha. The 2 men "were the first victims. They cooked the meat, and 12 hours later they were dead," said Azad. "Then some of the families who cooked the meat in their homes became victims." Fahim said there is no evidence to suggest terrorism played any part in the outbreak. (Anthrax is listed in Category A on the CDC list of Critical Biological Agents) *Non-suspect case

CHIKUNGUNYA (India): 2 Jan 2008, After affecting people in several villages of North 24-Parganas and some pockets of Kolkata, chikungunya has now spread to South 24-Parganas. Panic gripped residents of Mathurapur in South 24-Parganas after 7 people were tested as chikungunya positive last week. District health officials said the disease broke out at first in Lilua near Mathurapur last week; 25 residents of the area were suffering from fever, after which 7 were diagnosed to have chikungunya, said Dr Sachhidananda Sarkar, chief medical officer of health, South 24-Parganas. The district health authorities have issued an alert and sent a medical team to the affected village. Remedial measures are being taken to stop the disease from spreading to neighboring villages, said Dr Sarkar. "We have been organizing awareness camps at the village, and a medical team has already been sent. People have been requested to use mosquito-nets to minimize the risk of being afflicted with chikungunya," said a senior district health official. Apart from the health department, local body and block administrations have initiated a drive to control the breeding of mosquitoes. Disinfectants are being spread in drains and wetlands in the area. Medicines are also being distributed among the villagers. The local primary health centre has been asked to stay alert. The district health administrative officials are constantly monitoring the condition of the people suffering from fever. Chikungunya has already claimed a few lives in the city and in North-24 Parganas in the past months. "The situation is very much under control, as no fresh cases of chikungunya have been reported from Mathurapur in the past 3 days. There is nothing to panic about, as adequate remedial measures are being taken," said Dr Sarkar. (Emerging Infectious Diseases are listed in Category C on the CDC list of Critical Biological Agents) *Non-suspect case

BOTULISM, FOIE GRAS, RECALL (France): 2 Jan 2008, French authorities are investigating a case of contamination in a batch of foie gras. The French agriculture ministry said that *Clostridium botulinum*, the pathogen responsible for botulism, had been found by the national laboratory in a batch of duck foie gras under the Monfort label. The product has been recalled from the market, and a warning has been issued by the manufacturers. (Botulism is listed in Category A on the CDC list of Critical Biological Agents) *Non-suspect case

BOTULISM, AVIAN (Canada): 3 Jan 2008, The carcasses of hundreds of dead loons have washed up on the shores of the Great Lakes in recent months, and necropsies on the birds do not explicitly say what is killing one of the country's national symbols. But the fat, healthy-looking birds have congested organs and half-digested fish in their stomachs, leading biologists to believe the loons succumbed to a spreading epidemic that has killed 75,000 birds, including 9000 loons, in the Great Lakes since 1999. Diseased bird carcasses appeared in 2007 for the first time on the beaches of Georgian Bay, a wildlife expert said. In 2006, the deaths were seen for the first time in Lake Michigan. "Rather than sporadic outbreaks, which have occurred for years and years, now it is becoming much more generalized over the Great Lakes. It's becoming more widespread," said Kate Welch, a diagnostician with the Canadian Cooperative Wildlife Health Centre, who performs necropsies on the birds. The loons, symbols of Canadian wilderness, died after eating bad fish. More specifically, the loons died of type E botulism. "The thought of botulism turning the Great Lakes into killing fields, it's not a good situation," Joe Kaplan, a biologist in Hancock, Michigan said. The toxin produced paralyzes the loons, Dr. Welch said; when they are no longer able to hold their heads up, they drown. No cases of human illness have been associated with the avian botulism outbreaks that have occurred on the Great Lakes. Humans only come in contact with type E botulism by eating infected fish or birds. (Botulism is listed in Category A on the CDC list of Critical Biological Agents) *Non-suspect case

CHIKUNGUNYA (Indonesia): 4 Jan 2008, Chikungunya disease has infected thousands of people in Bandarlampung over December 2007. In the worst hit area, Waydadi subdistrict in Sukarame, the mosquito-borne disease has struck 500 or so residents in 3 neighborhood units. Of the residents in the RT 13 neighborhood, 90 percent have been infected by chikungunya virus. The infection rate is similarly high in the RT 10 and RT 12 neighborhood units. Waydadi district chief Amil Riadi said he was unaware that residents were infected with chikungunya virus. "There were no reports from the subdistrict office or community health centers," said Amil. The disease spread to a number of districts in Bandarlampung starting in November 2007, as rainy season approached. Aside from Sukarame district, the disease has also infected residents in North and South Telukbetung, Kemiling, Sukaraja, Panjang, and Kedaton districts. Bandarlampung Health Office deputy head Tri Henny Sukemi said her office was coordinating with the provincial health office to carry out a fumigation drive in a number of subdistricts deemed rife with the disease. The coordinator of the Coalition for a Healthy Lampung (KULS), Herdimansyah, said provincial and city health officials had been sluggish in responding to the outbreak. He added the number of sufferers in Lampung might be more than 1000 because community health centers and doctors treating patients generally do not report cases to the health office. "Many sufferers also do not seek treatment because they cannot afford to," he said. Bandarlampung Health Office head Reihana said a number of subdistricts in the city were believed to be the breeding grounds of *Aedes aegypti* mosquitoes, the carrier of the disease, due to an unclean environment and poor sanitary habits. (Emerging Infectious Diseases are listed in Category C on the CDC list of Critical Biological Agents) *Non-suspect case

EBOLA HEMORRHAGIC FEVER (Uganda): 4 Jan 2008, The Ministry of Health wishes to update the general public on the Ebola situation in the country. The cumulative total is 149 patients with 37 deaths. In Bundibugyo District, 5 people are currently admitted, one in Kikyo Health Centre and 4 in Bundibugyo Hospital. Of these, one new suspected case has been registered and is admitted in Bundibugyo hospital in the last 24 hours. One patient was discharged from Kikyo Health Centre. On a good note, 441 out of 771 contacts have completed 21 days of follow up and are considered safe. The Ministry of Health continues to urge the public to avoid unnecessary movements and gatherings especially in the districts around Bundibugyo, that is, Kabarole, Kasese, Hoima, Kibaale, Kyenjojo, Kamwenge, Ibanda, Bushenyi, and Mbarara. As we end the festive season, all District Health Officers, in charge of Health Units and the general public should not relax but continue being on alert and immediately report any suspected cases. Similarly, the public is reminded to report to Health Facilities any persons who present with the following symptoms: very high fever of sudden onset, diarrhea, vomiting associated with red eyes, and a measles-like rash. Ebola is spread by close contact with body fluids of infected persons or people who have died of Ebola. The Ministry assures the general public that the epidemic is still confined in Bundibugyo district and is getting contained. The public is urged to be compassionate and provide care and support to persons that have been discharged. The public should continue to be vigilant but without creating unnecessary fear and panic. (Viral hemorrhagic fevers are listed in Category A on the CDC list of Critical Biological Agents) *Non-suspect case

ANTHRAX, BOVINE (Australia): 5 Jan 2008, During December 2007, anthrax was confirmed on a total of 9 farms in the Scone district located within the Upper Hunter River Valley catchment. The New South Wales Department of Primary Industries (NSW DPI) has instituted quarantine measures, incineration of carcasses, and vaccination on affected and neighboring farms. Surveillance has been intensified in the district to detect any other cases. Vaccinated farms will remain under movement restrictions for at least 42 days post vaccination. Rapid tracing of animals and animal products from affected farms has been assisted by the National Livestock Identification System (NLIS). (Anthrax is listed in Category A on the CDC list of Critical Biological Agents) *Non-suspect case

*Cases and outbreaks will be cited for suspect level with regards to suspicion of BT threat. Therefore, cases and outbreaks will be categorized as "Determined BT", "Suspect" or "Non-suspect".

OTHER RESOURCES AND ARTICLES OF INTEREST:

More information concerning Public Health and Emergency Preparedness can be found at the Office of Preparedness and Response website: <http://bioterrorism.dhmm.state.md.us/>

NOTE: This weekly review is a compilation of data from various surveillance systems, interpreted with a focus on a potential BT event. It is not meant to be inclusive of all epidemiology data available, nor is it meant to imply that every activity reported is a definitive BT event. International reports of outbreaks due to organisms on the CDC Critical Biological Agent list will also be reported. While not "secure", please handle this information in a professional manner. Please feel free to distribute within your organization, as you feel appropriate, to other professional staff involved in emergency preparedness and infection control.

For questions about the content of this review or if you have received this and do not wish to receive these weekly notices, please e-mail me. If you have information that is pertinent to this notification process, please send it to me to be included in the routine report.

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